

FIG. 1

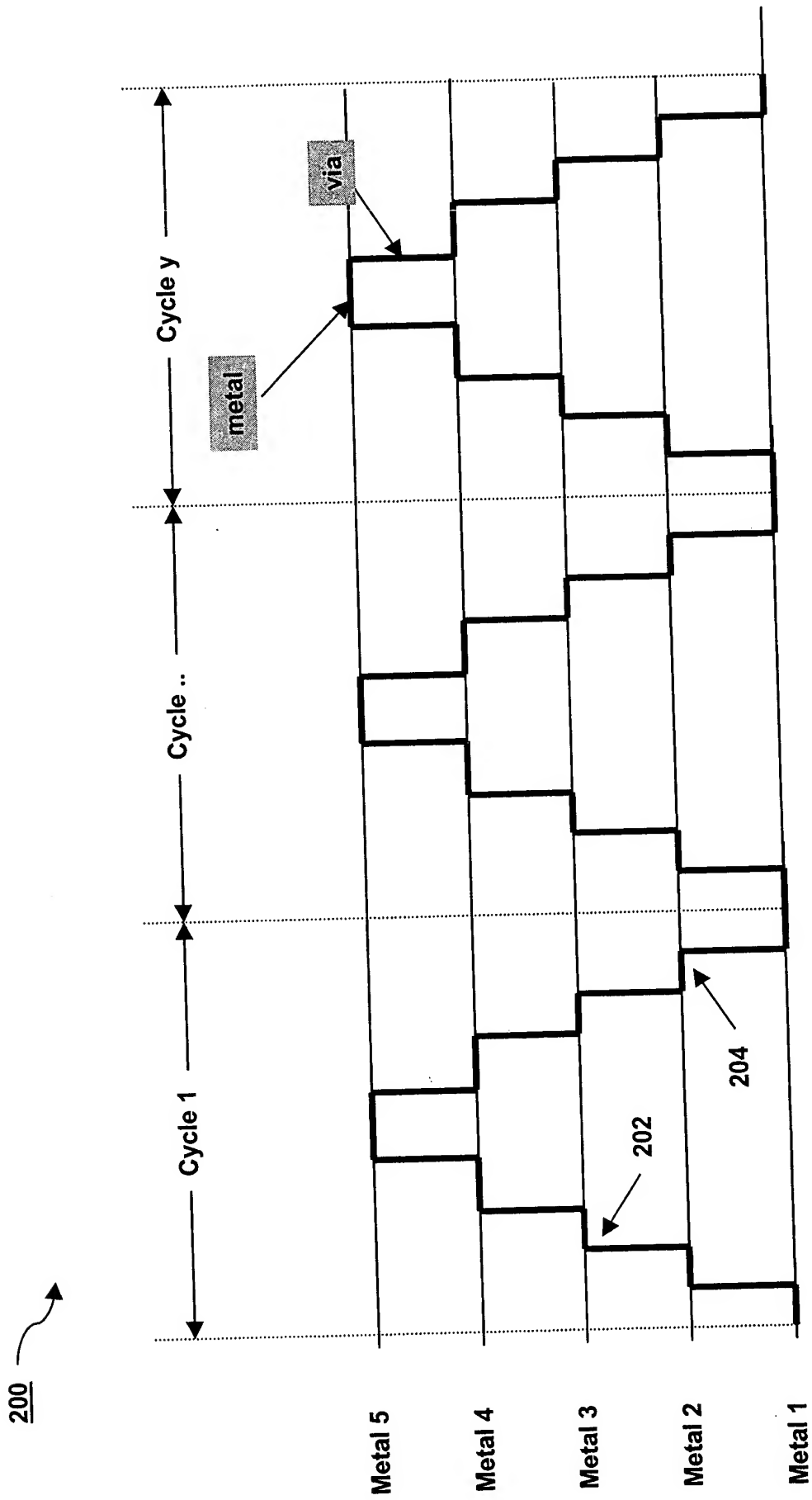


FIG. 2

300

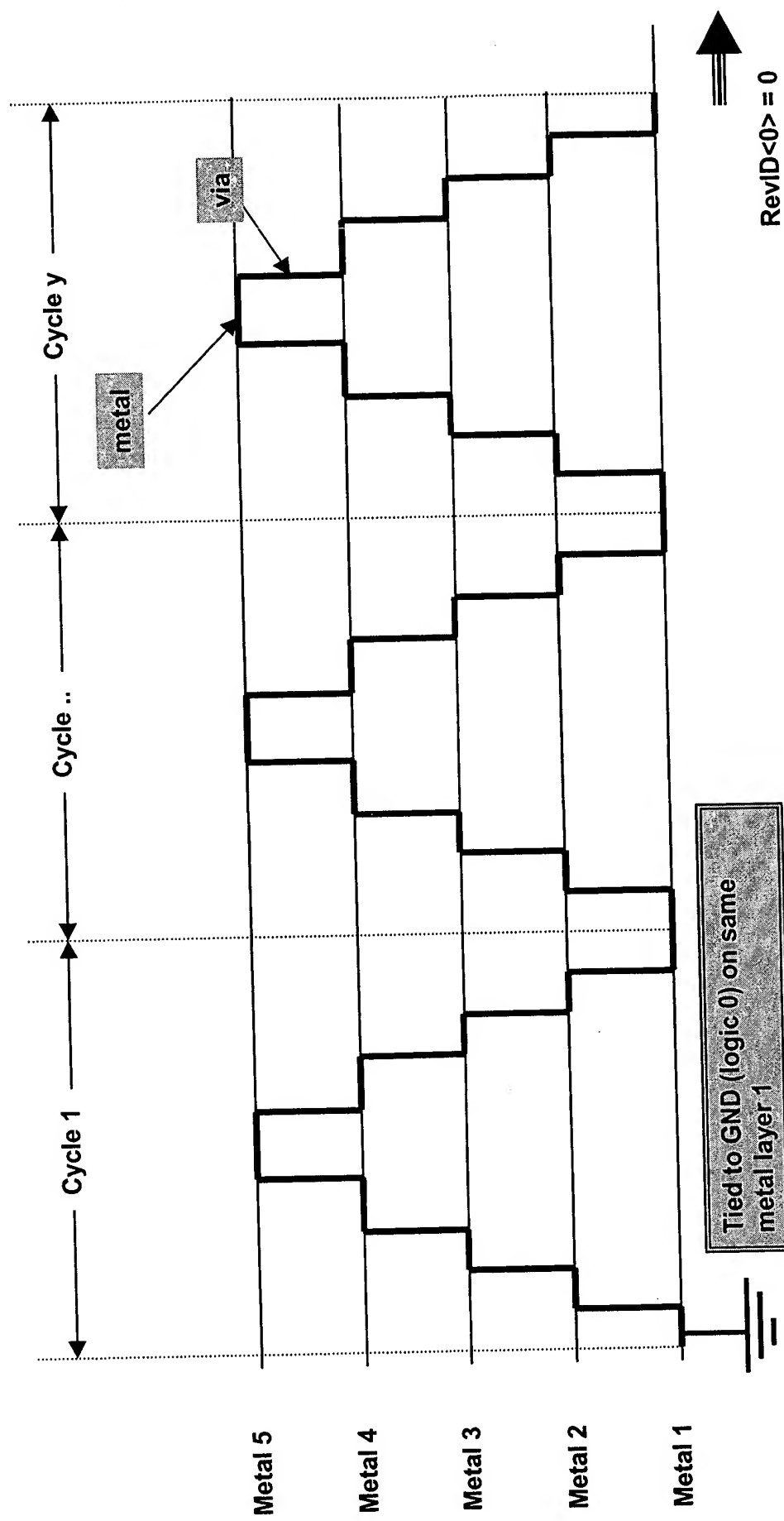


FIG. 3A

300

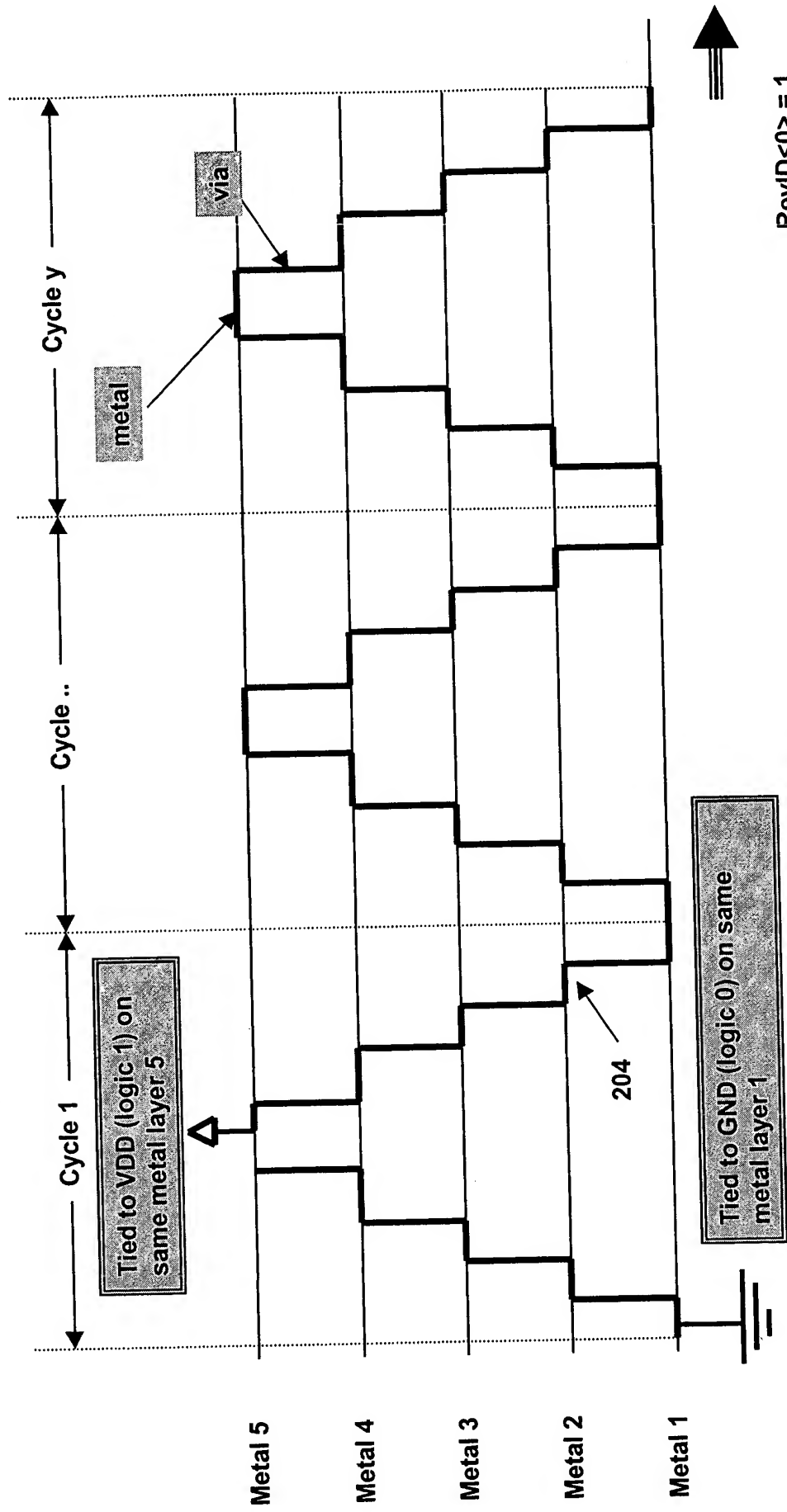


FIG. 3B

RevID<0> = 1



300

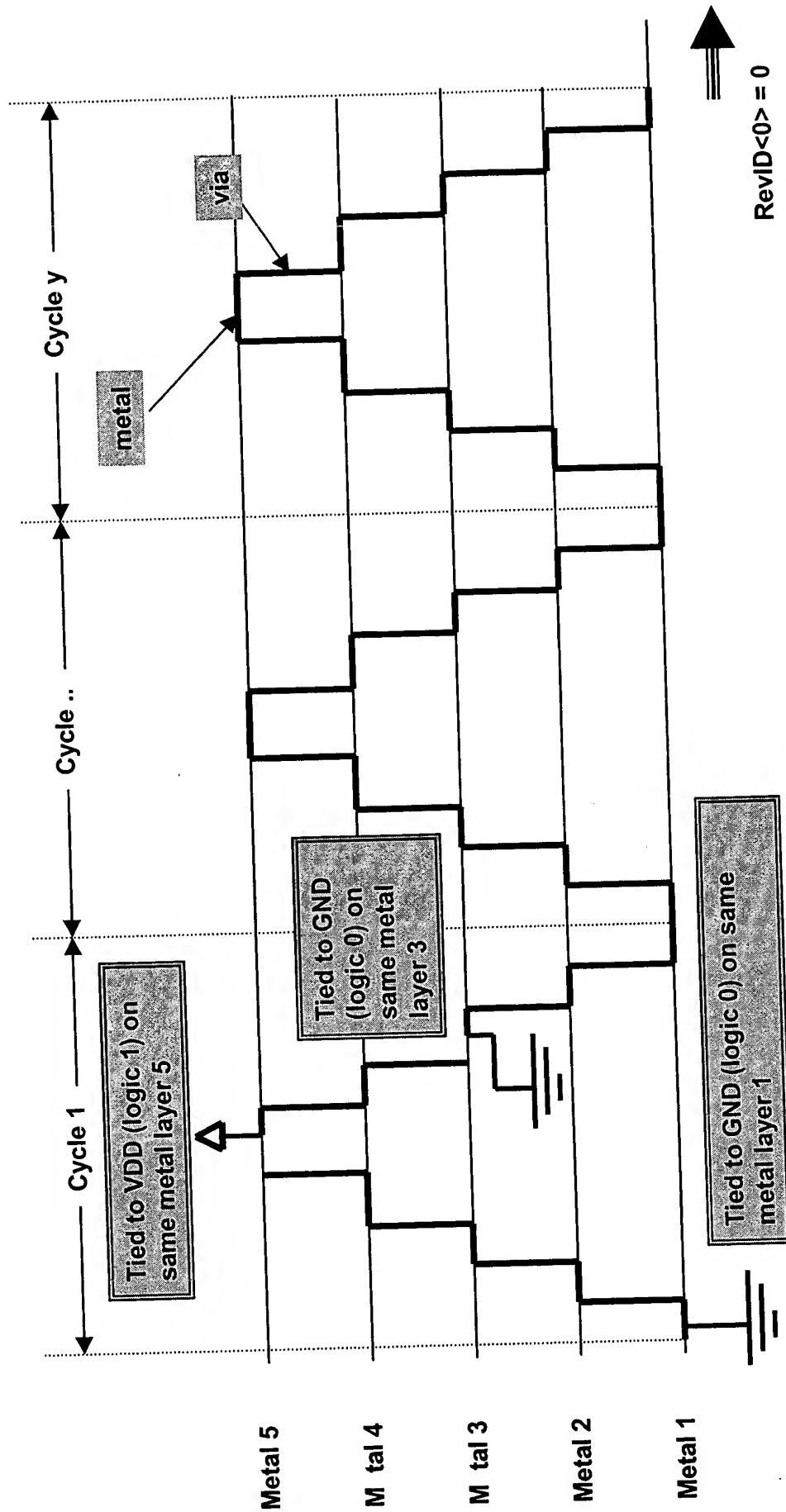


FIG. 3C

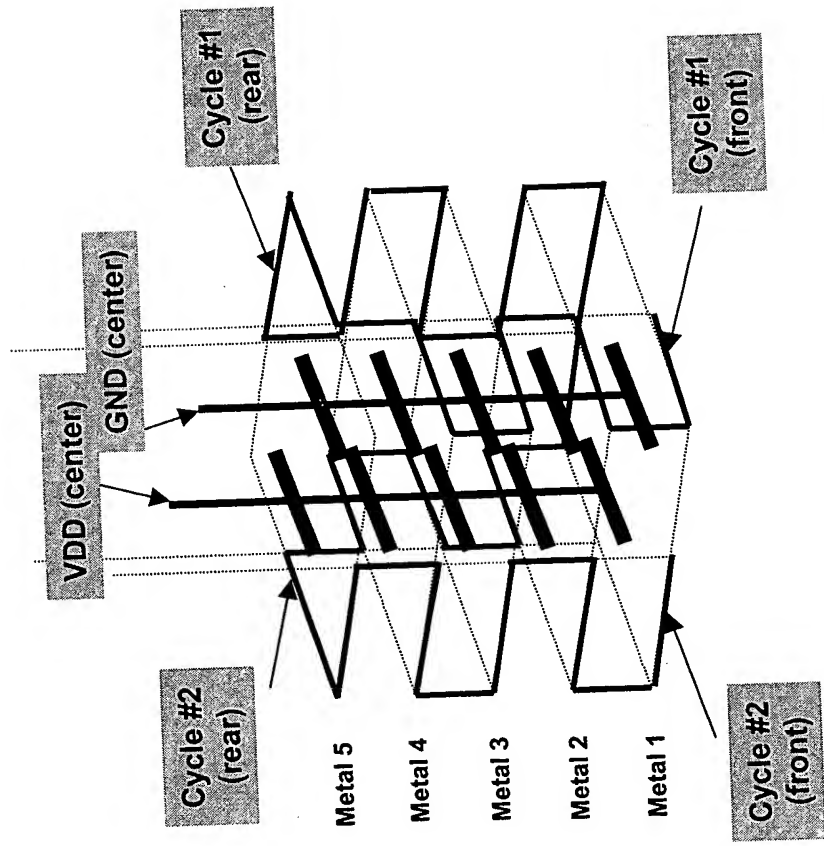


FIG. 4

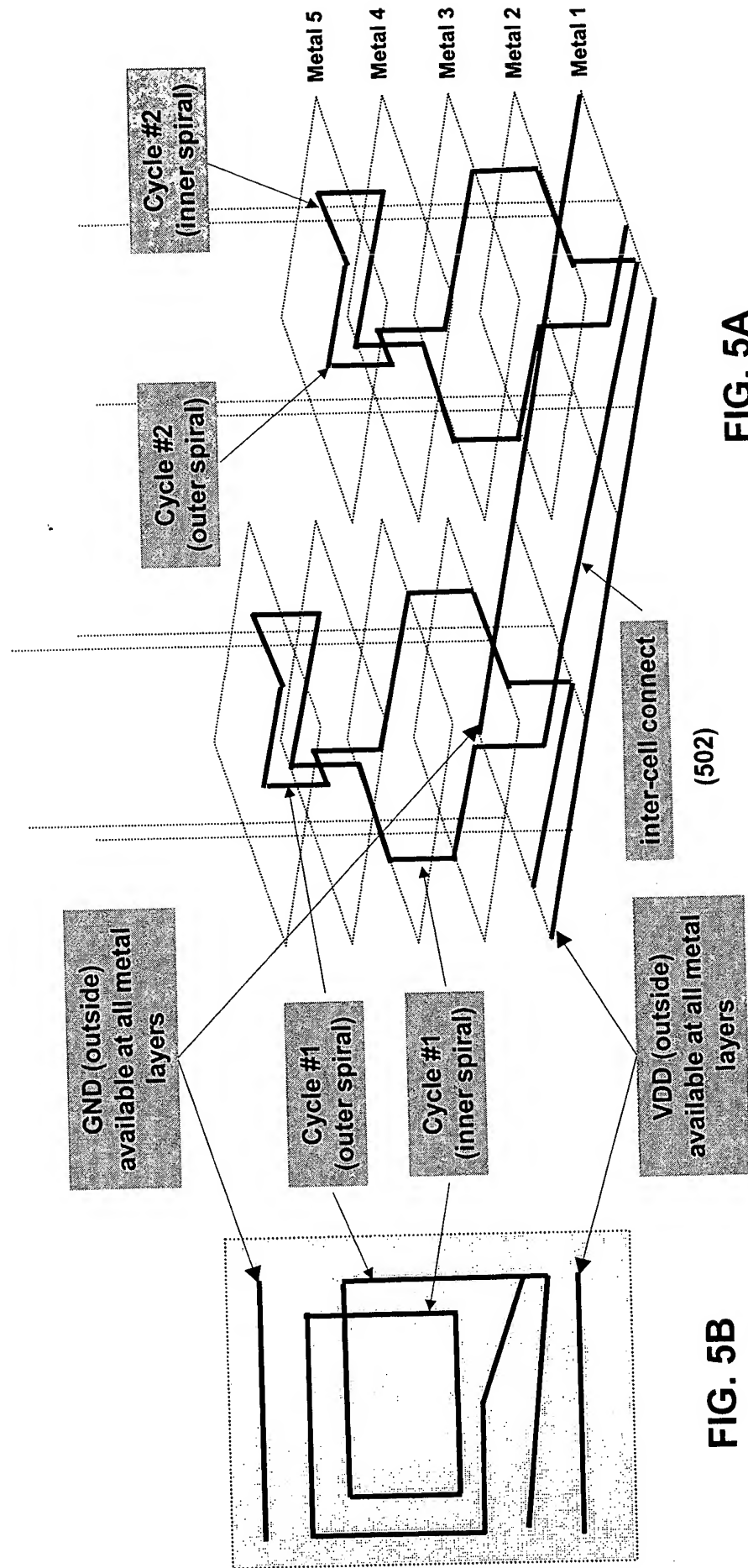


FIG. 5B

FIG. 5A

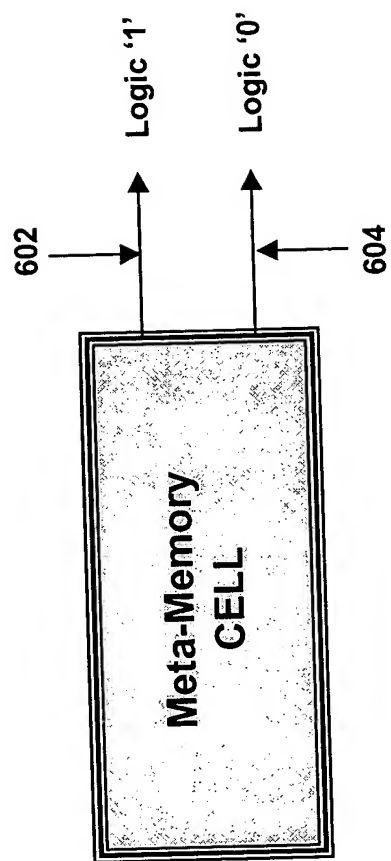


FIG. 6

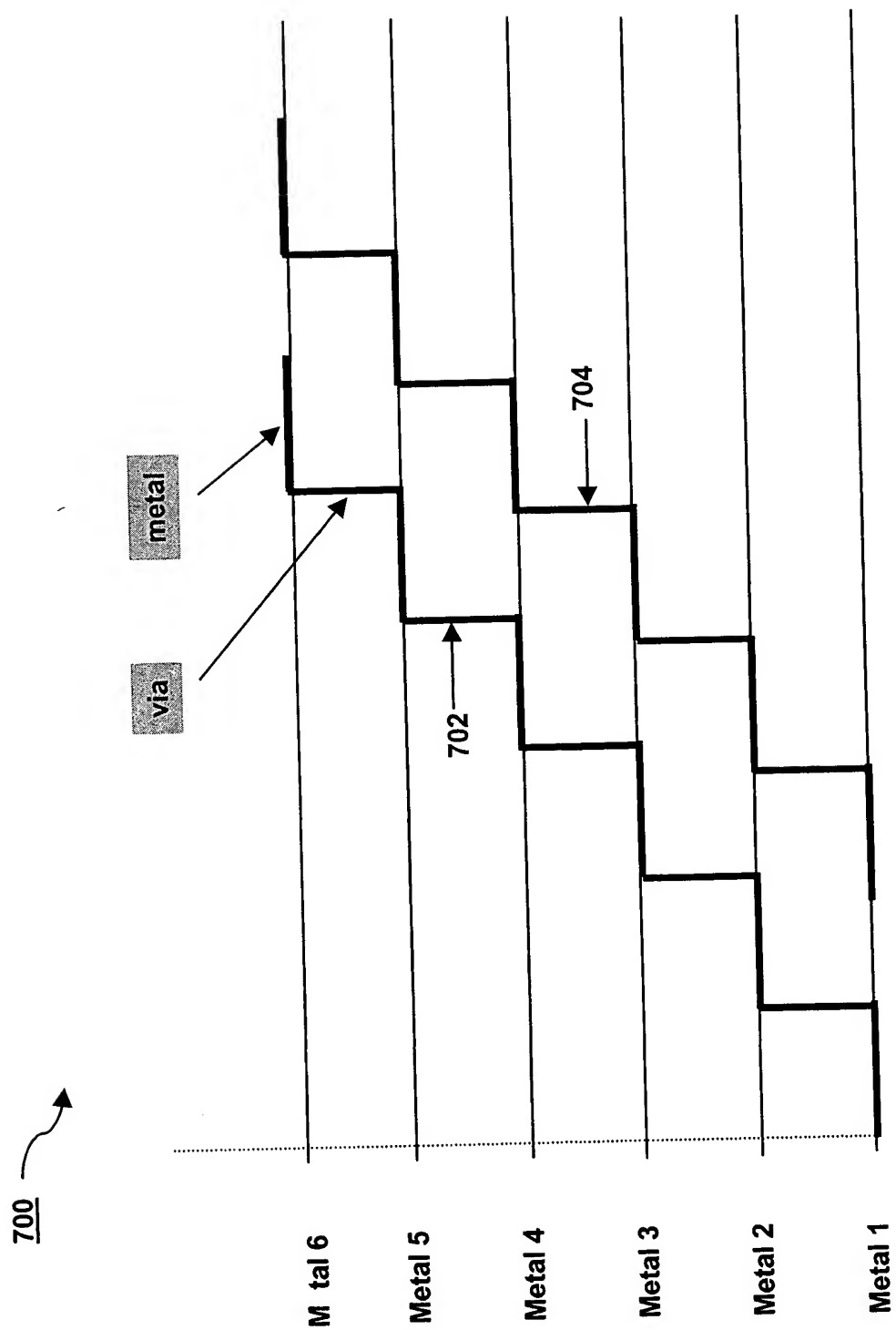


FIG. 7A

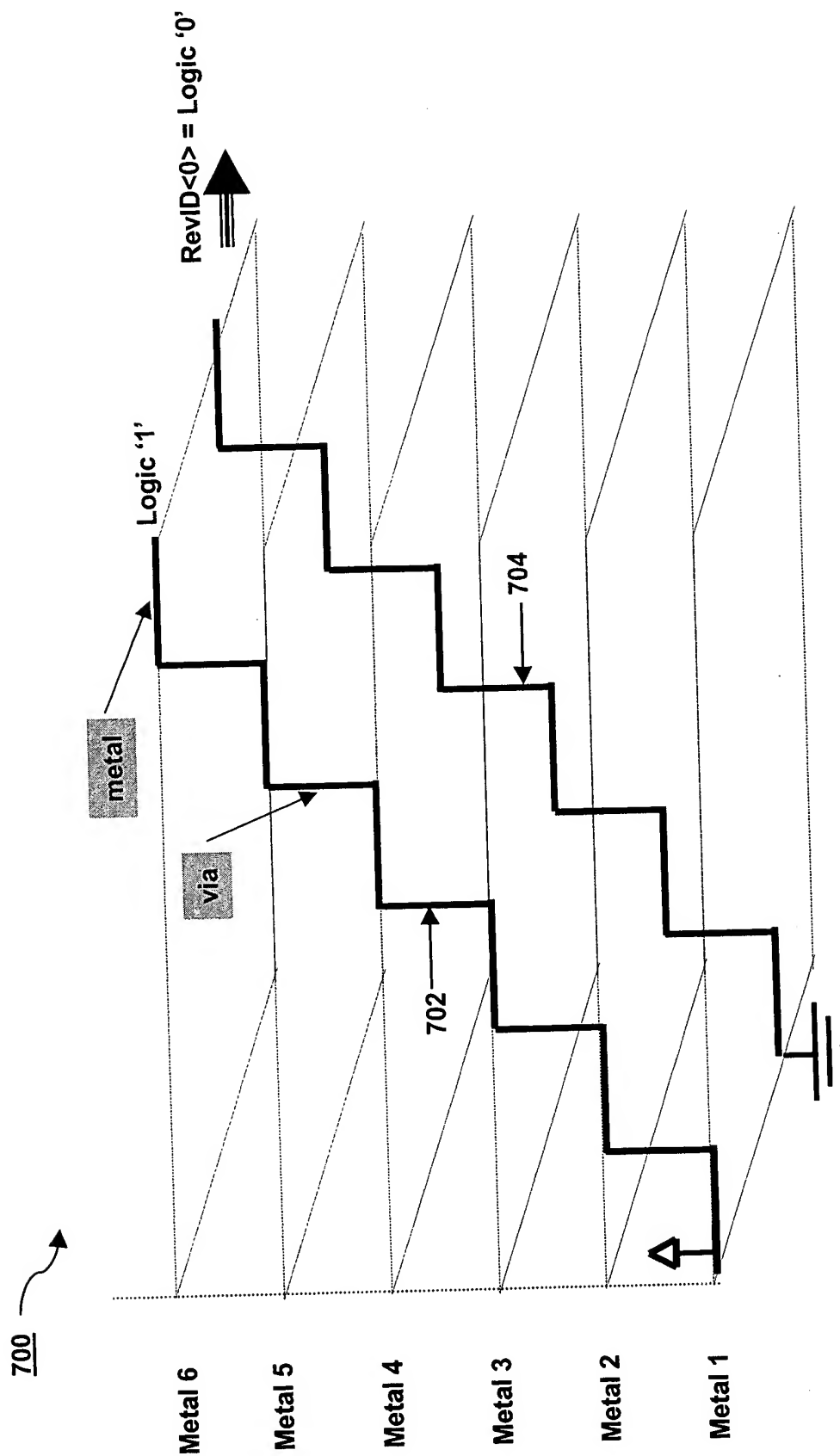


FIG. 7B

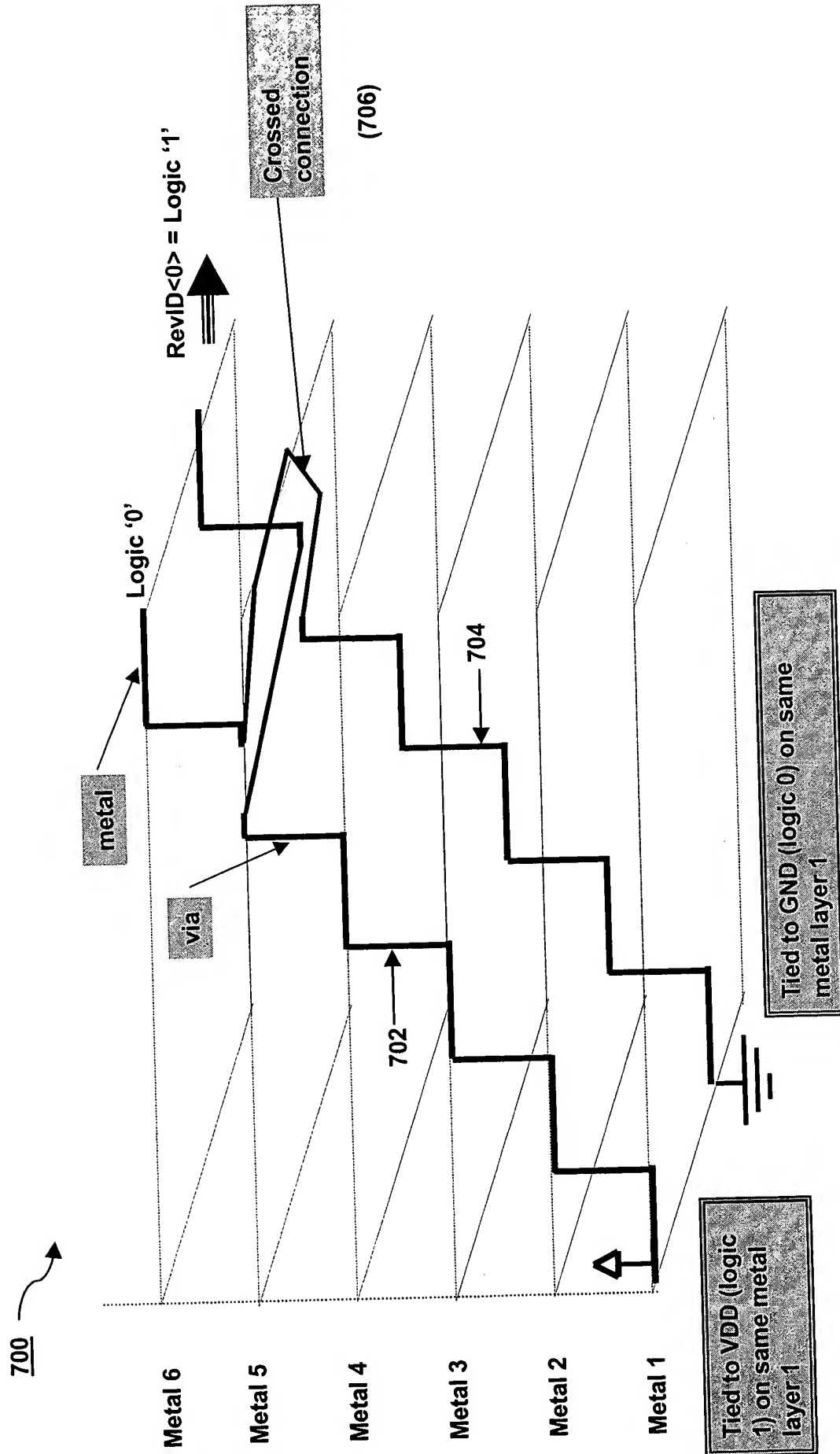


FIG. 7C

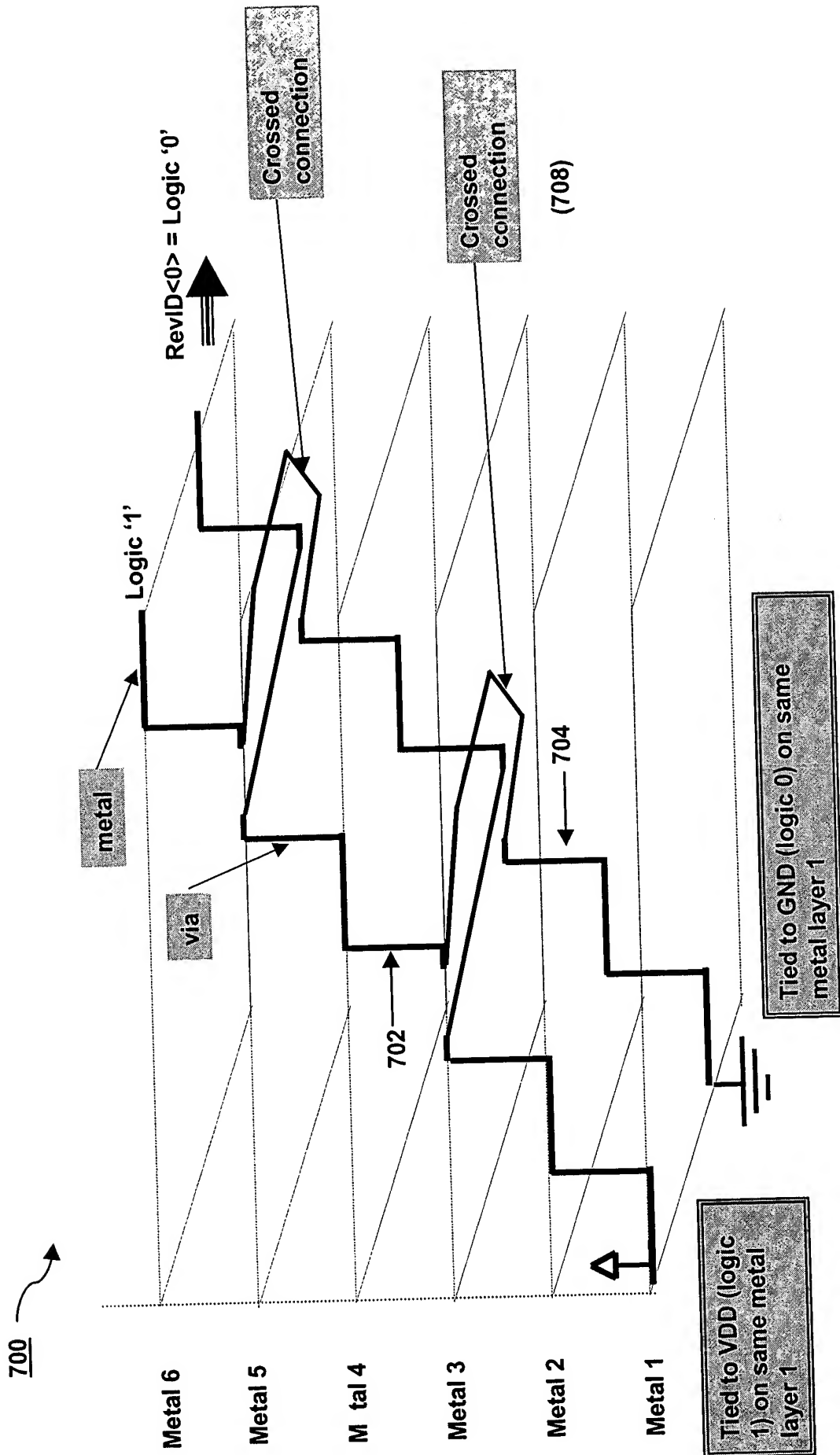


FIG. 7D



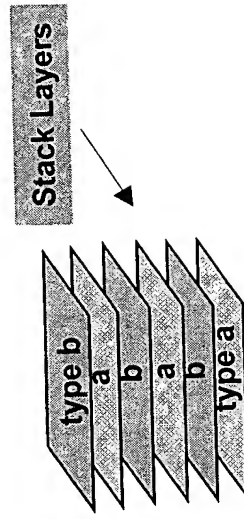


FIG. 8A

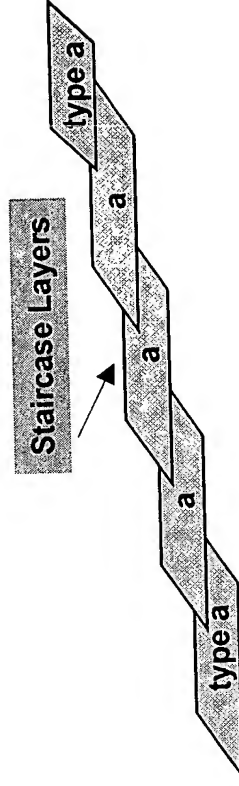


FIG. 8B

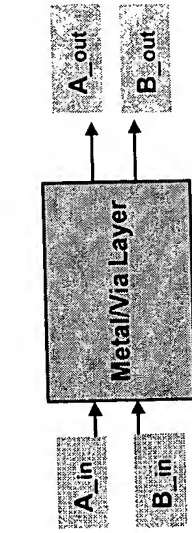


FIG. 9A

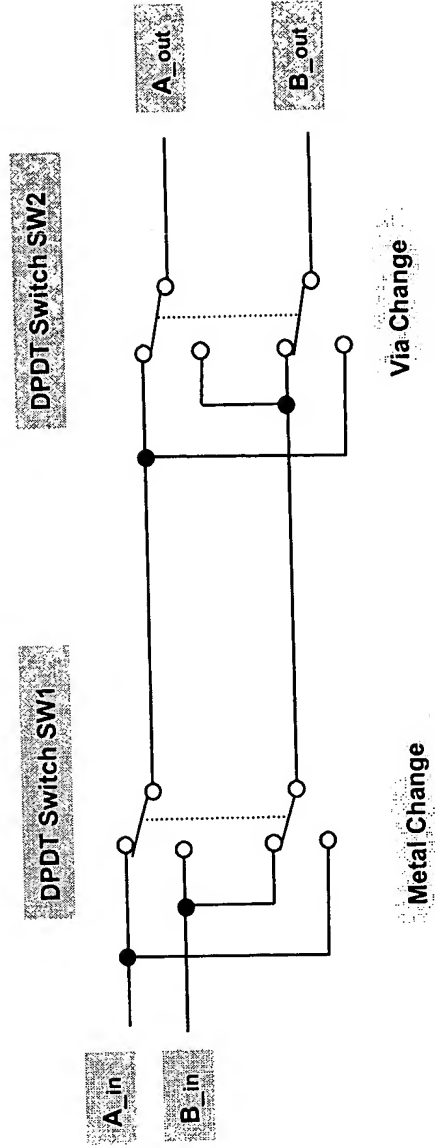


FIG. 9B

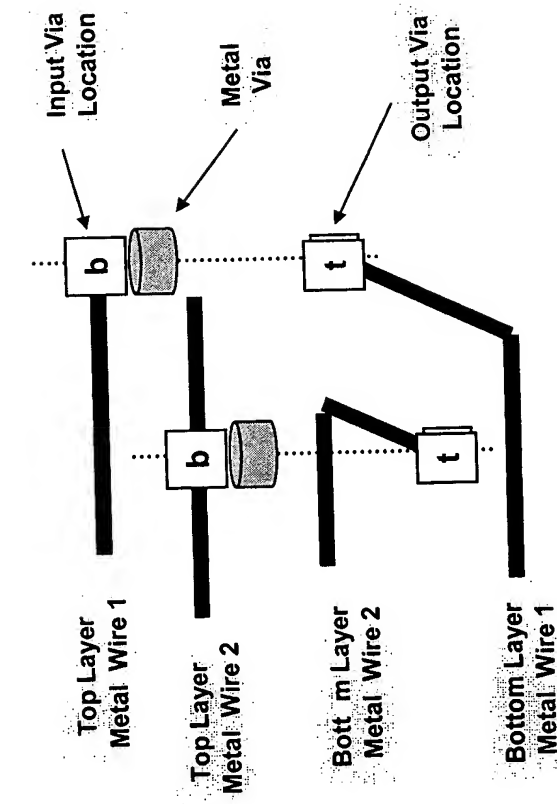


FIG. 9C

2 disconnects  
2 connects

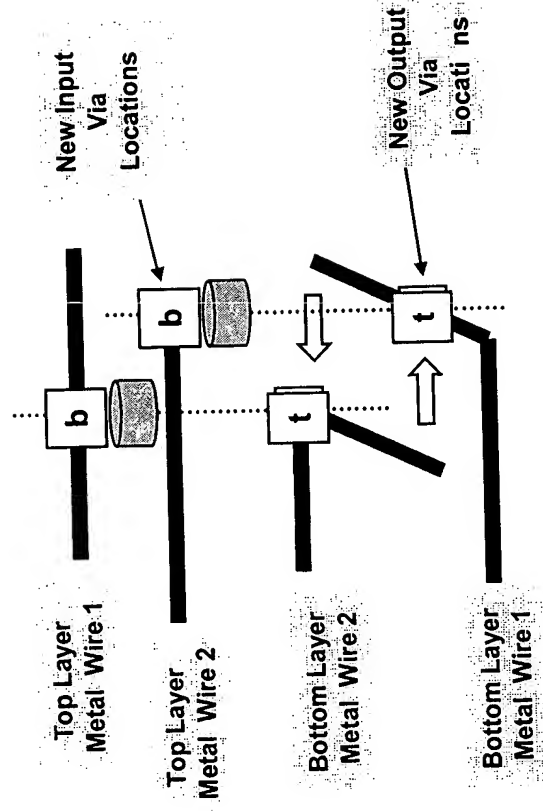


FIG. 9D

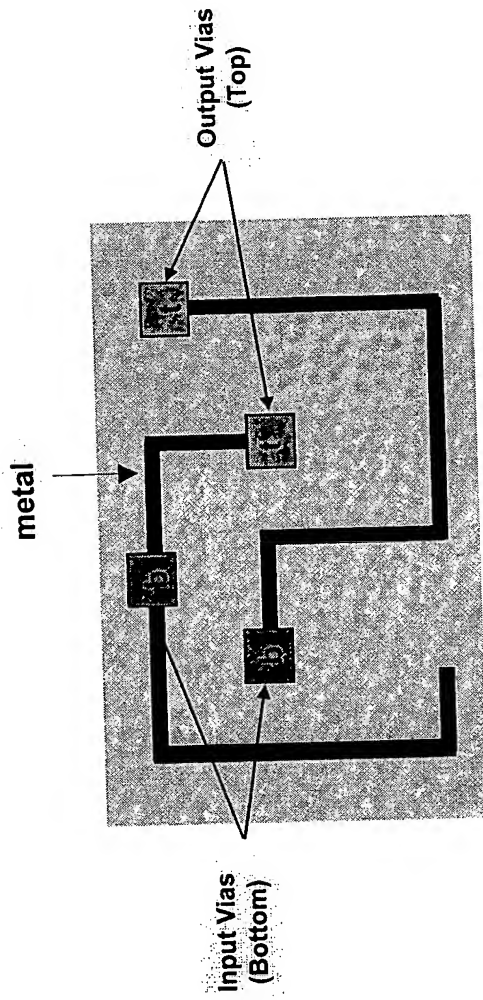


FIG. 10A

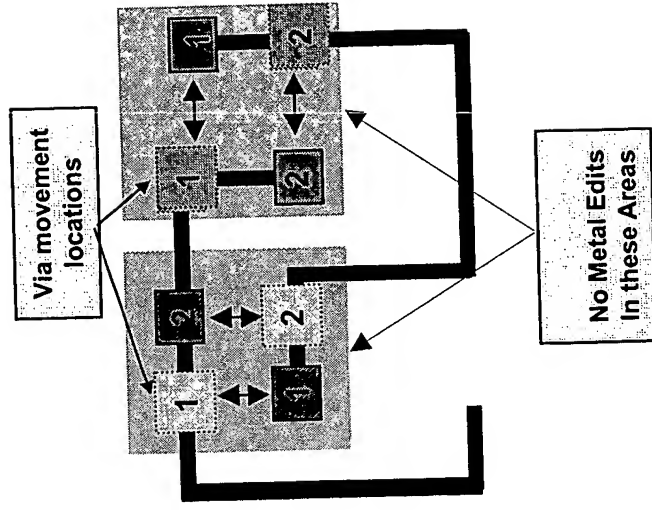
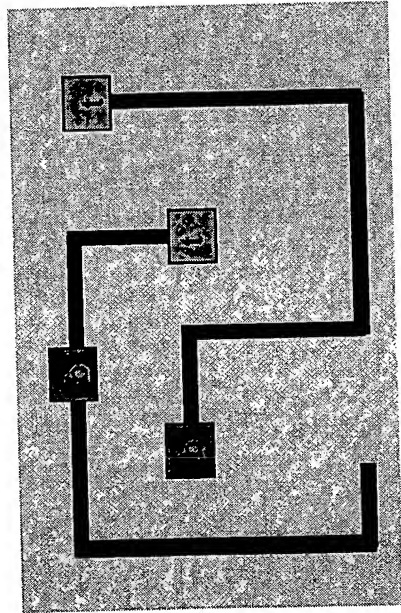


FIG. 10B

FIG. 11A



Used in metal layers 1,3,5,7,... (odd)

Basic Pattern



Basic Pattern w/ Metal Change (2 cuts, 2 jumps)

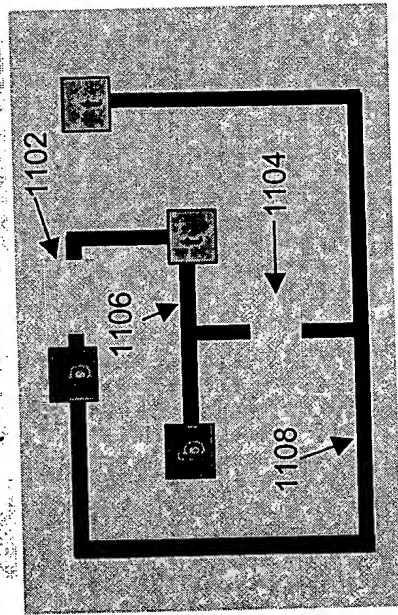
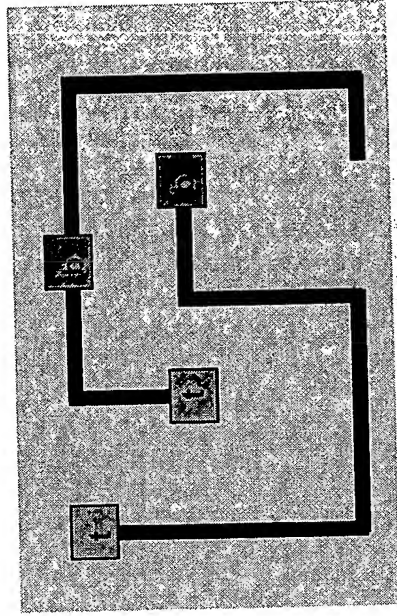


FIG. 11B

FIG. 11C



Used in metal layers 2,4,6,... (even)

Flip Basic Pattern



Flip Basic Pattern w/ Metal Change (2 cuts, 2 jumps)

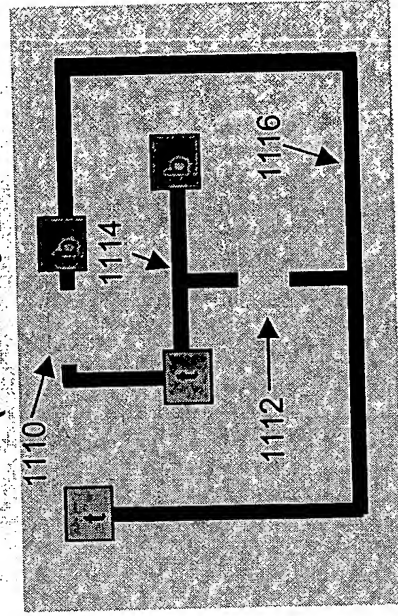
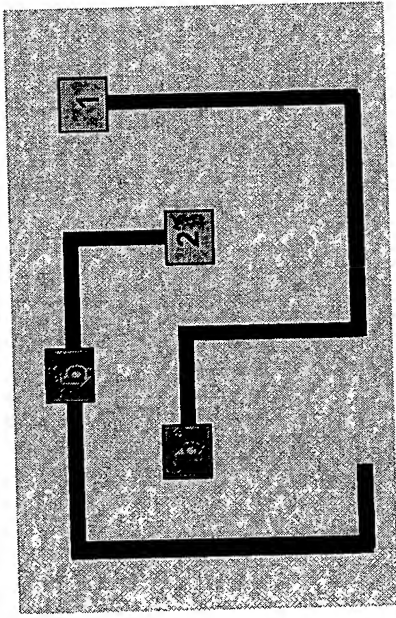


FIG. 11D

FIG. 12A



Basic Pattern



Basic Pattern w/ Via Change  
(2 disconnects, 2 connects)

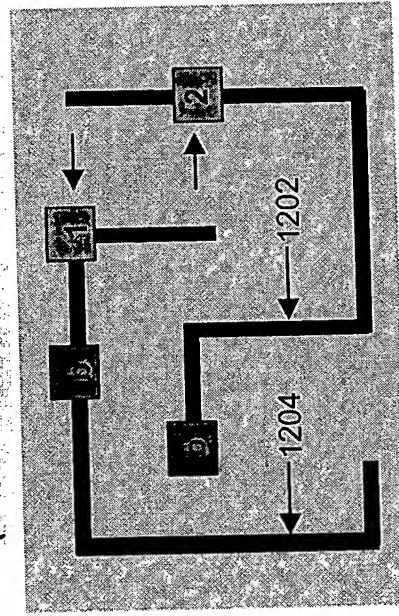
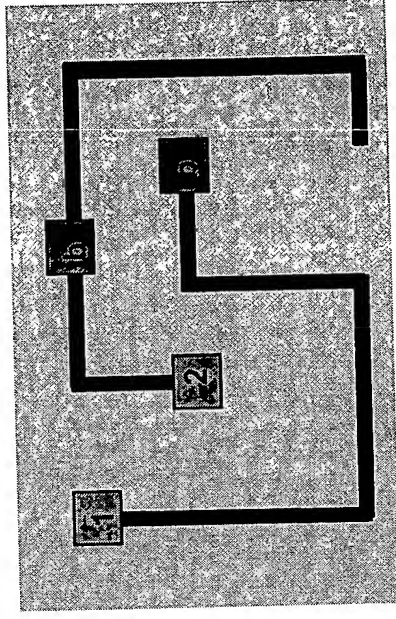


FIG. 12B

FIG. 12C



Flip Basic Pattern



Flip Basic Pattern w/ Via Change  
(2 disconnects, 2 connects)

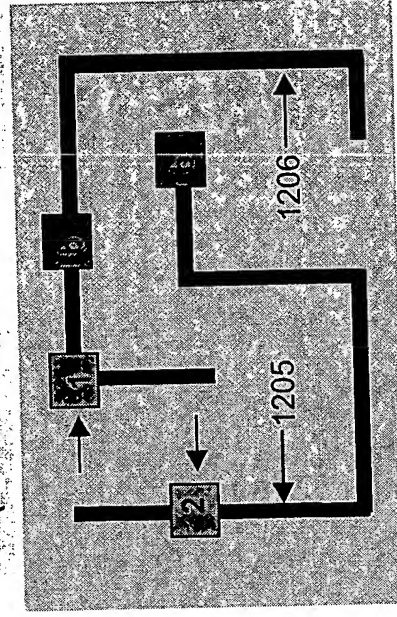


FIG. 12D

Basic Pattern

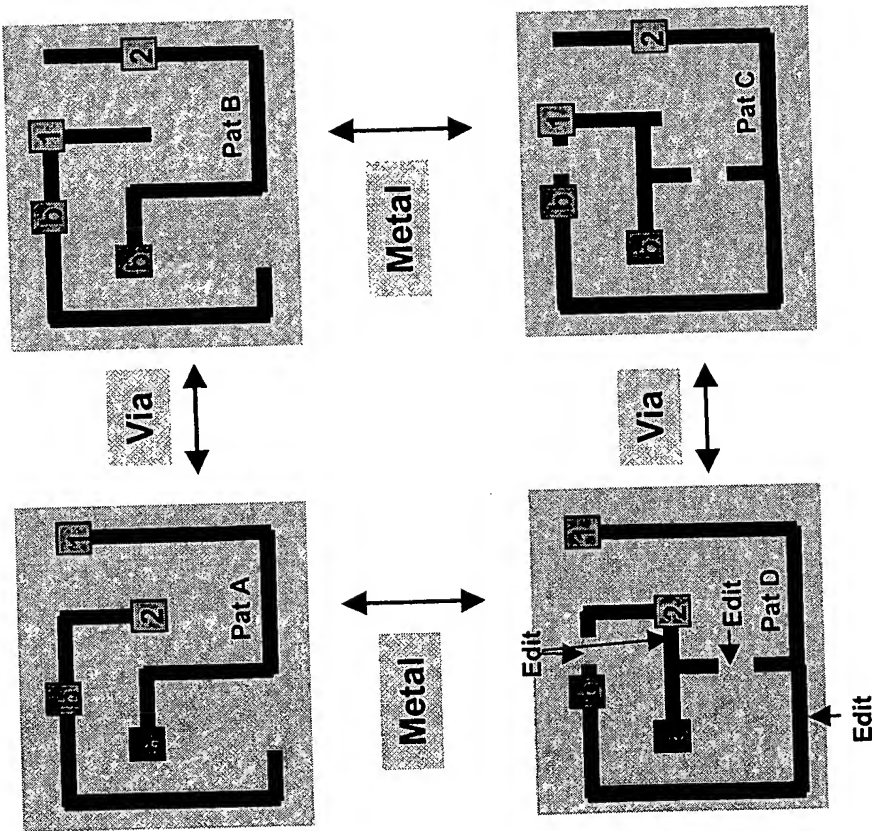


FIG. 13

Flip Basic Pattern

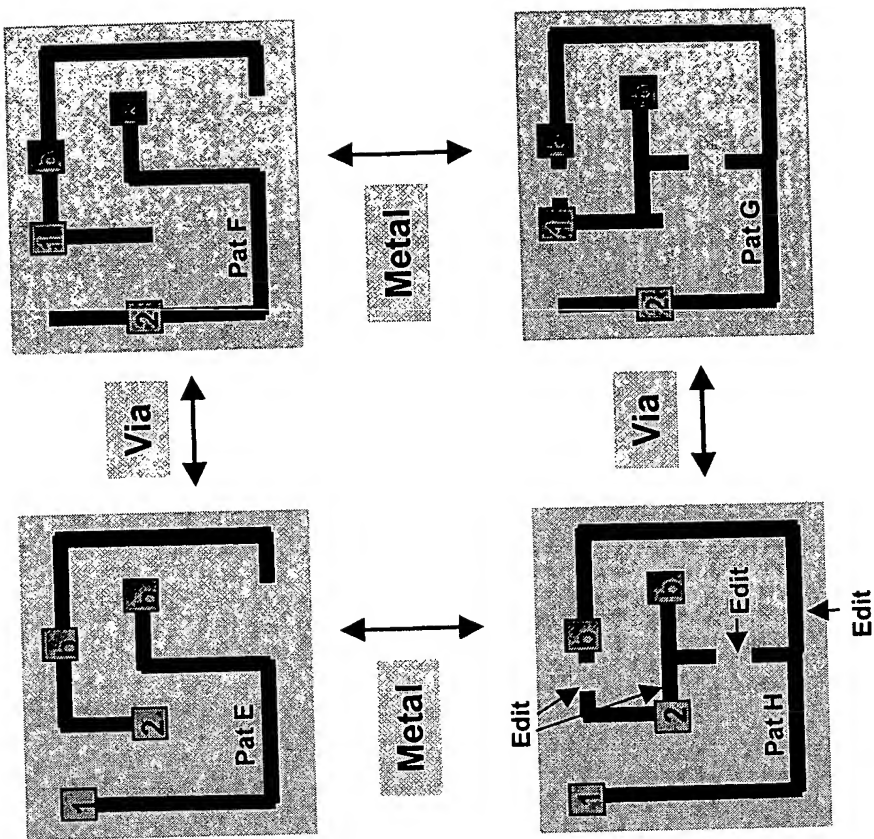


FIG. 14



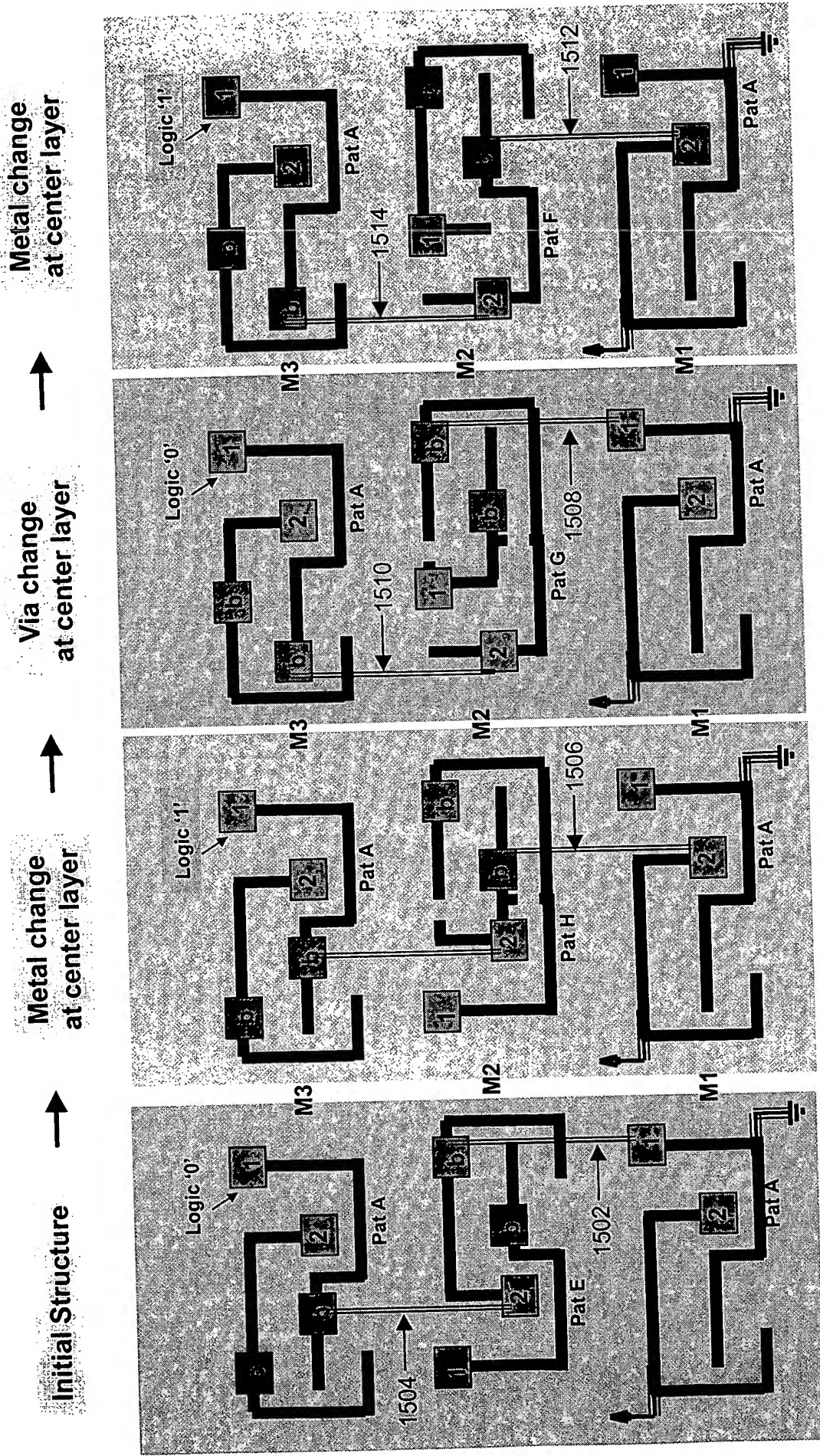


FIG. 15D

FIG. 15C

FIG. 15B

FIG. 15A



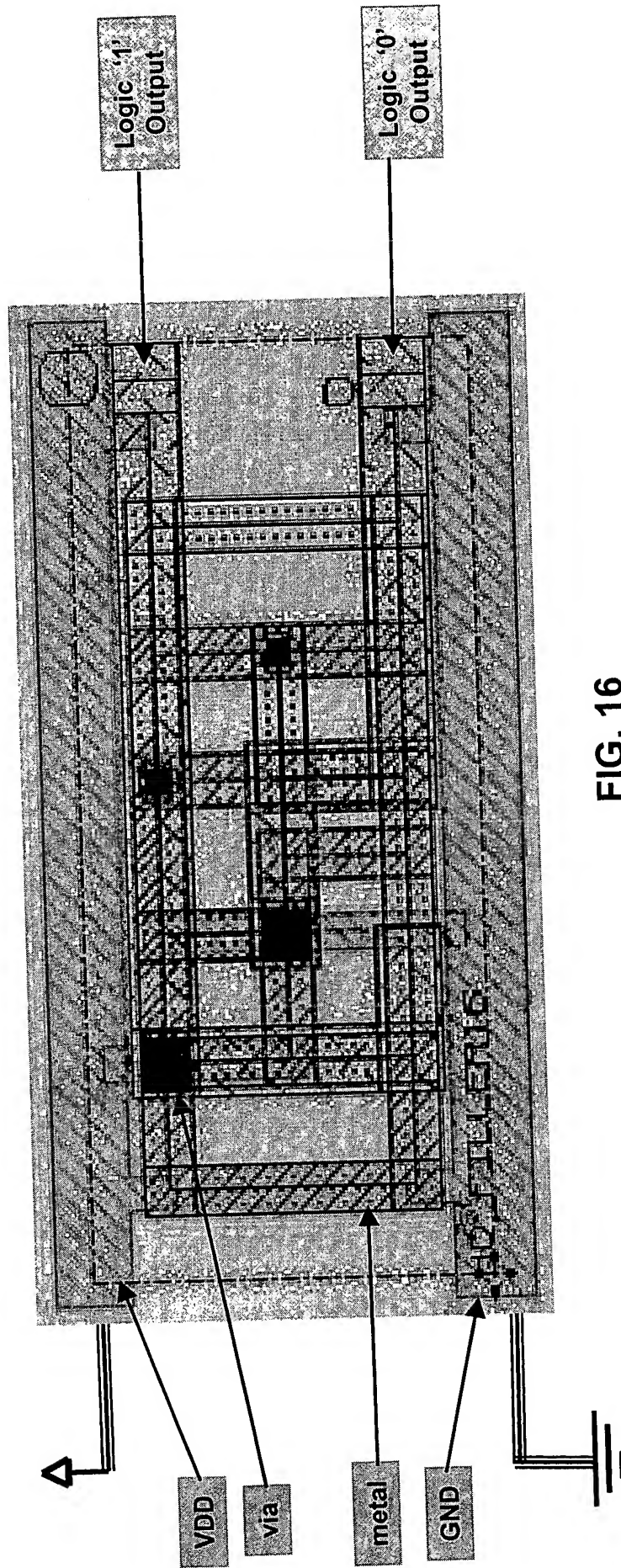
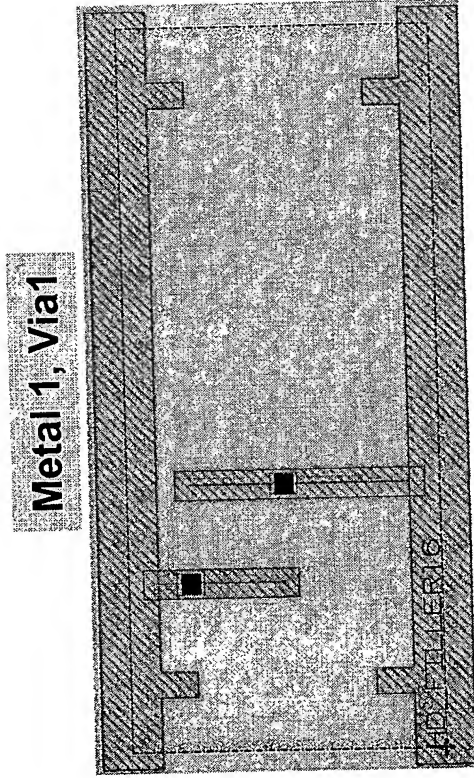


FIG. 17A



Metal 2

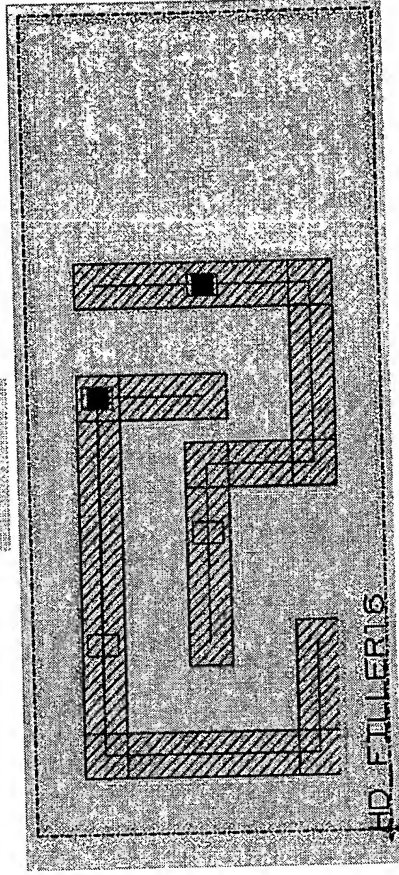
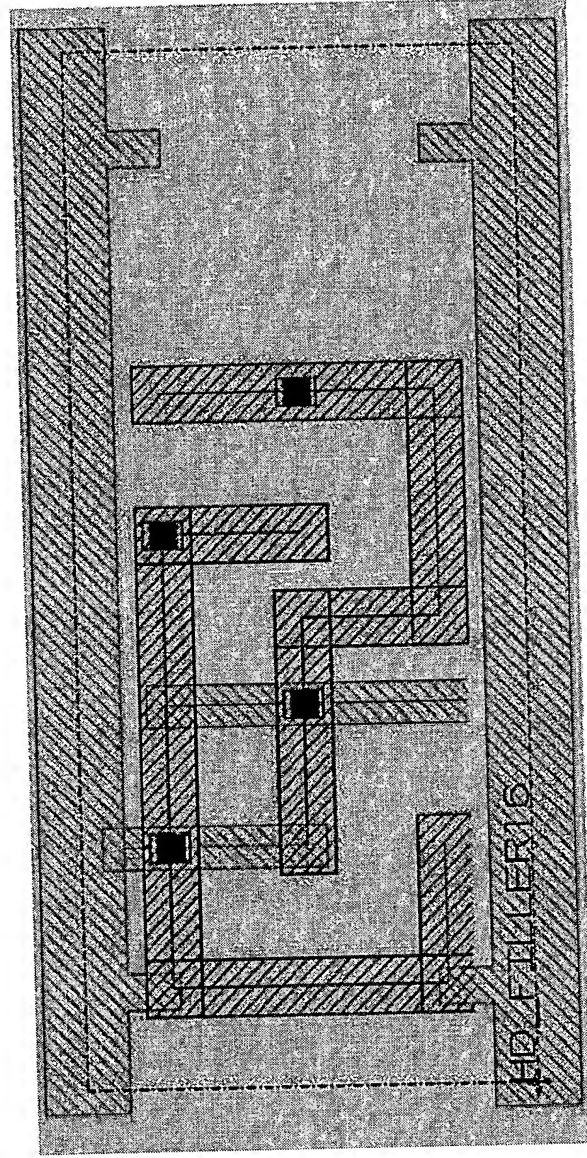


FIG. 17B



Metal 1, Via1,  
Metal 2

FIG. 17C

FIG. 18A

Metal 2, Via2

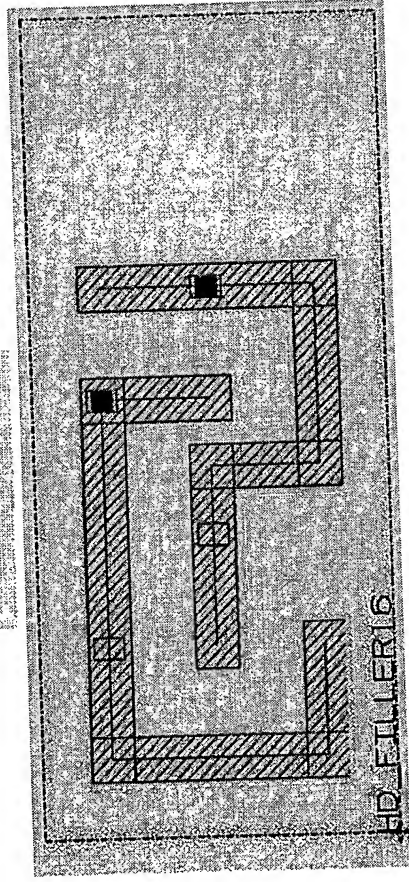
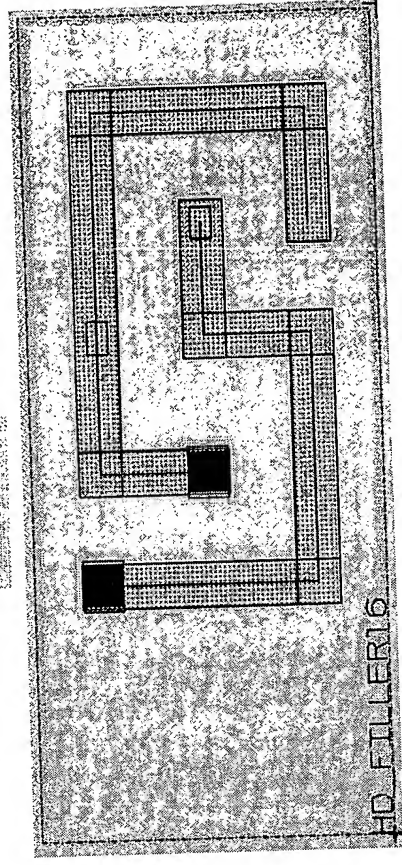


FIG. 18B

Metal 3



Metal 2, Via2,  
Metal 3

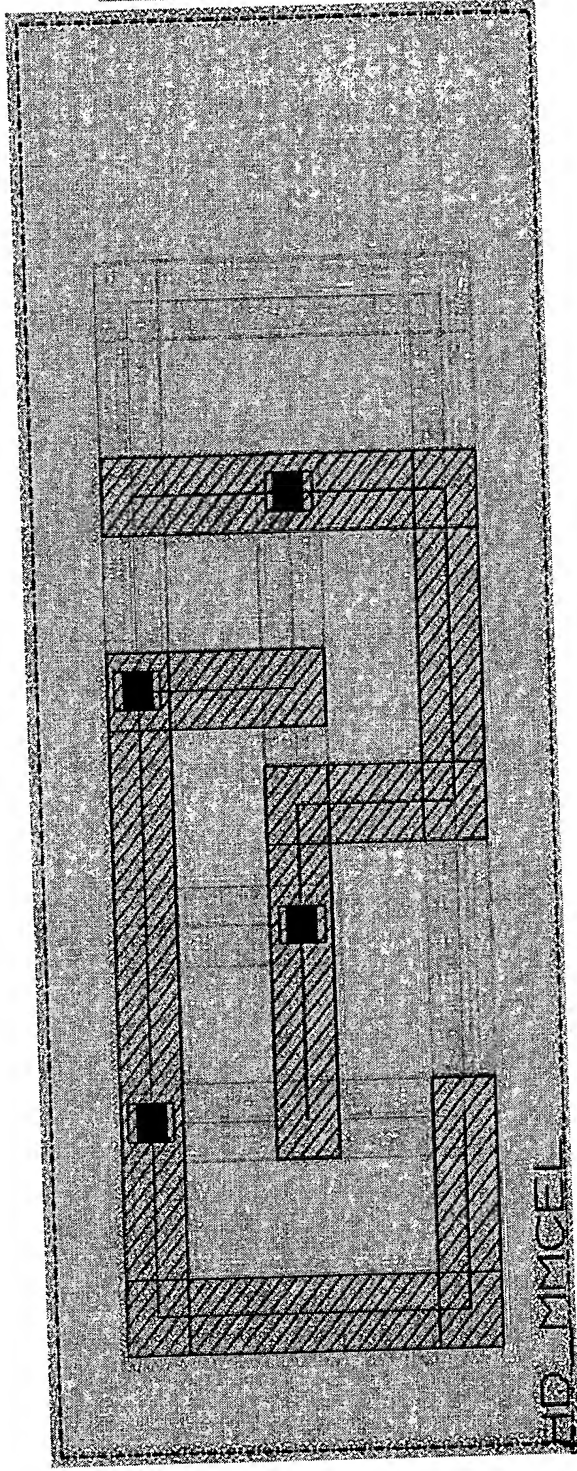


FIG. 18C



FIG. 19B

Metal 4

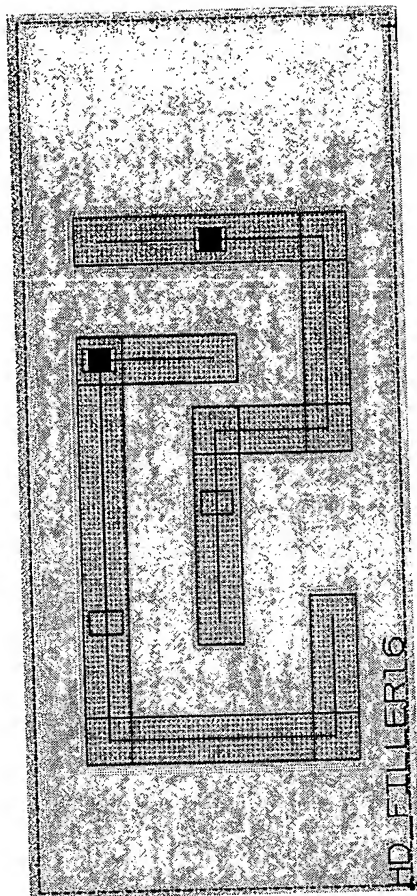
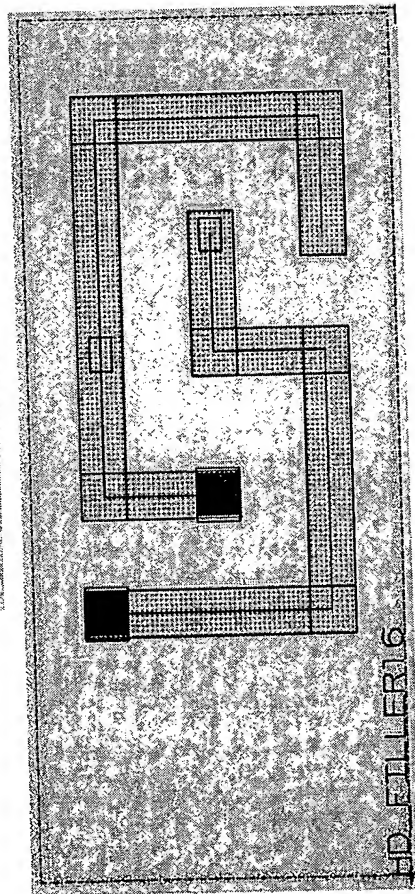


FIG. 19A

Metal 3, Via3



Metal 3, Via3,  
Metal 4

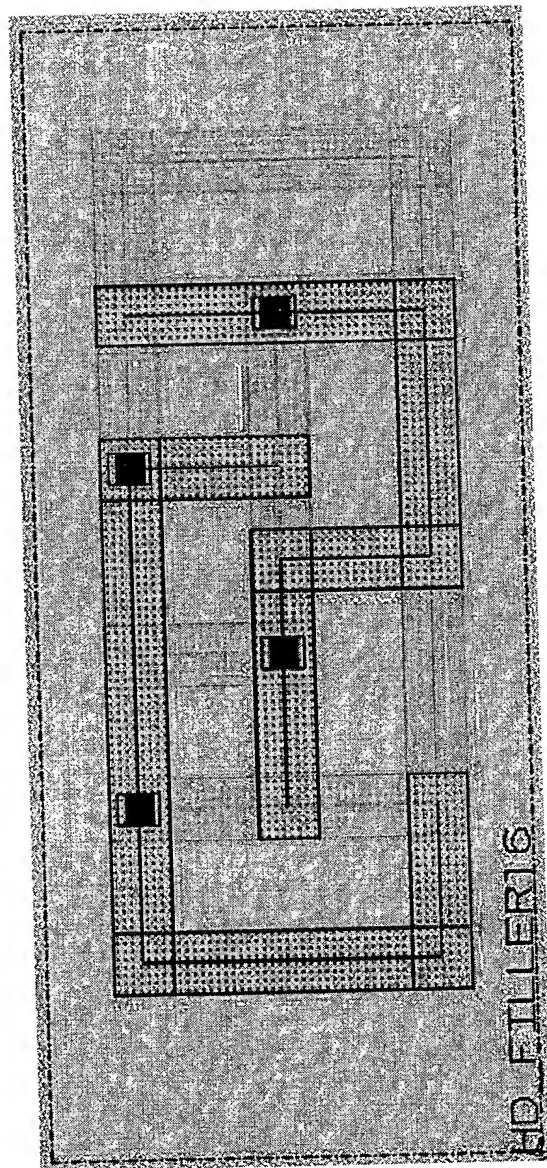


FIG. 19C

FIG. 20B

Metal 5

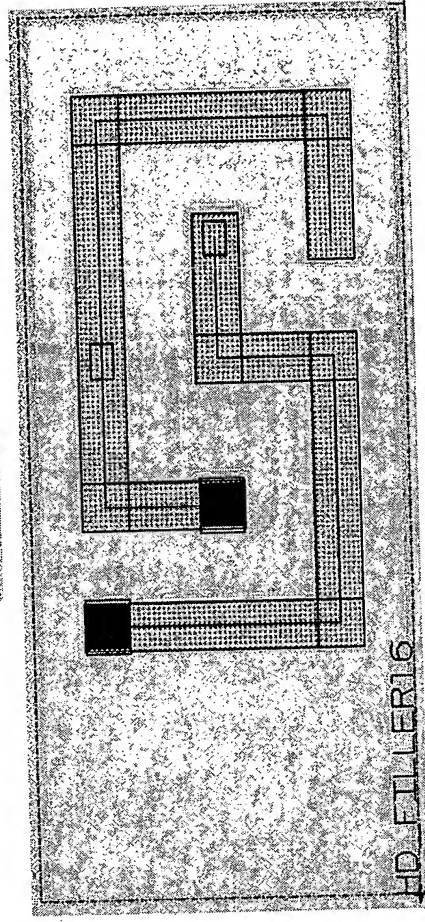
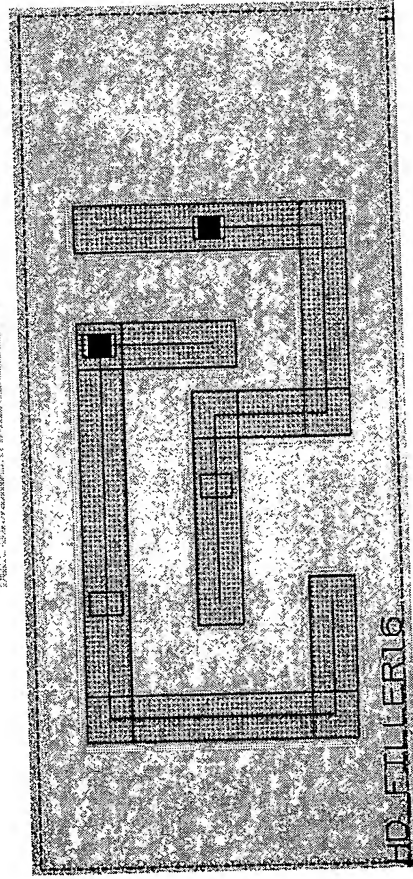


FIG. 20A

Metal 4, Via4



Metal 4, Via4,  
Metal 5

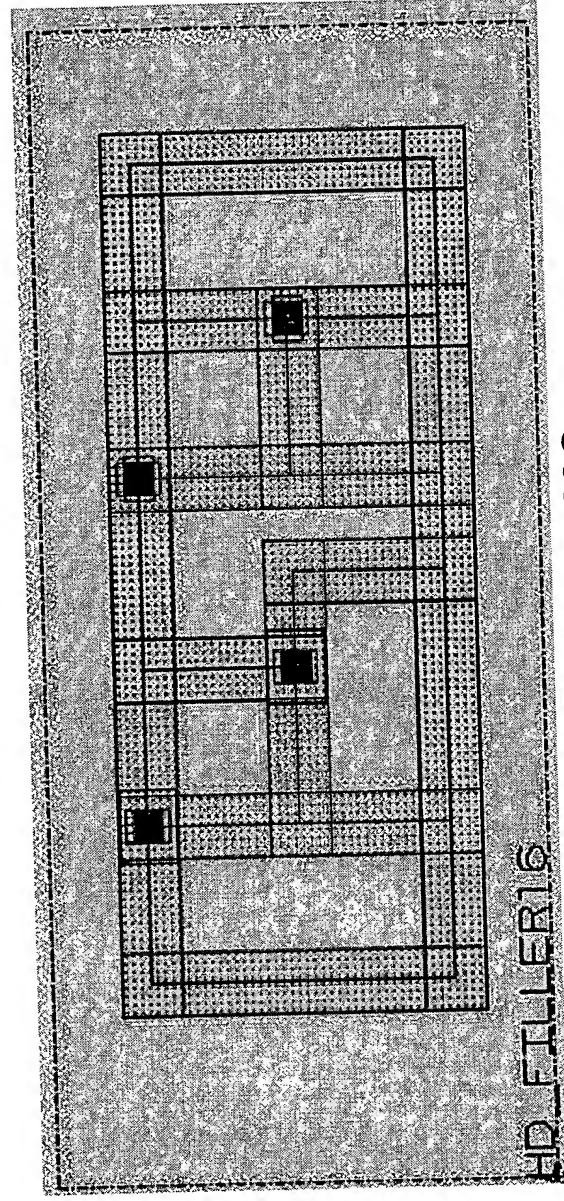
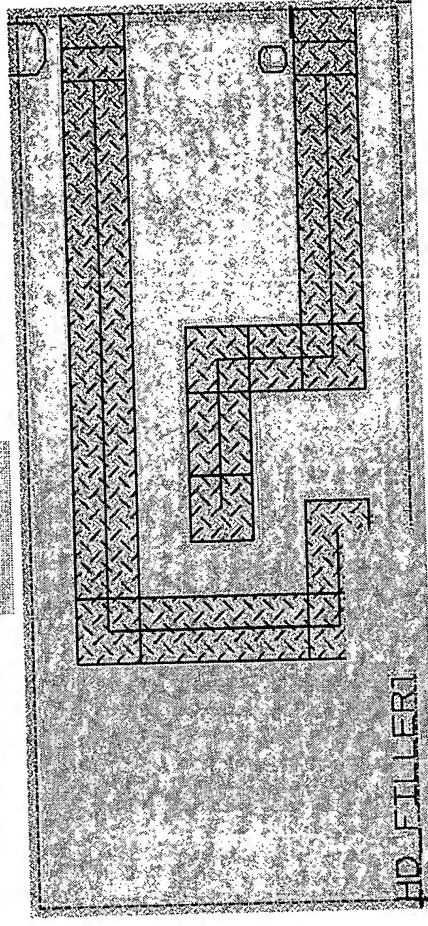


FIG. 20C



FIG. 21B

Metal 6



Metal 5, Via5,  
Metal 6

FIG. 21A

Metal 5, Via5

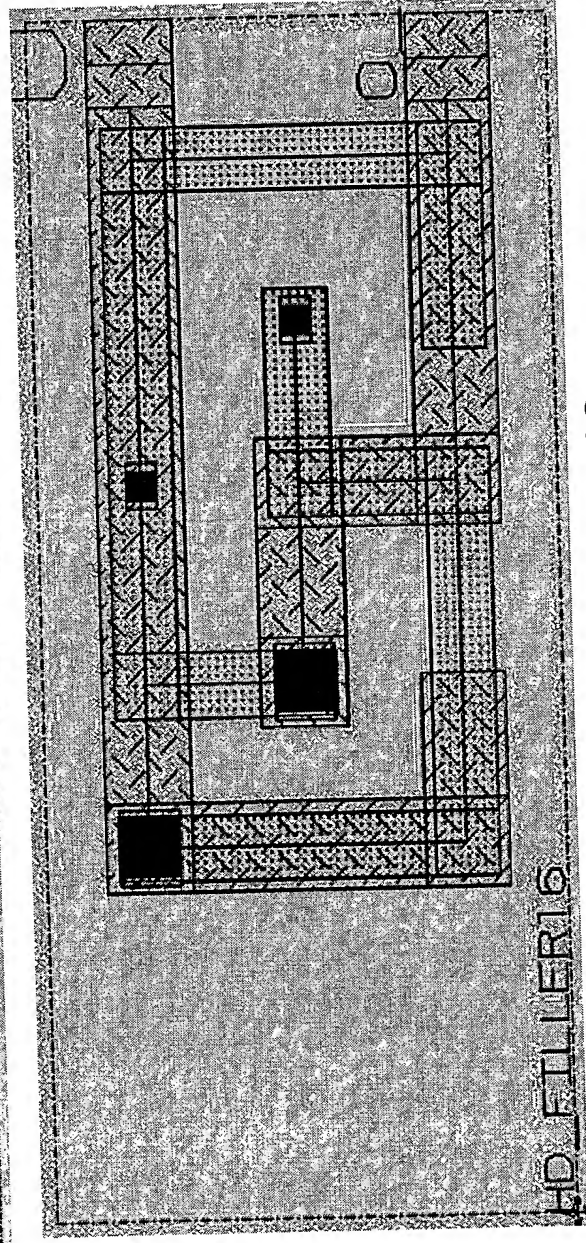
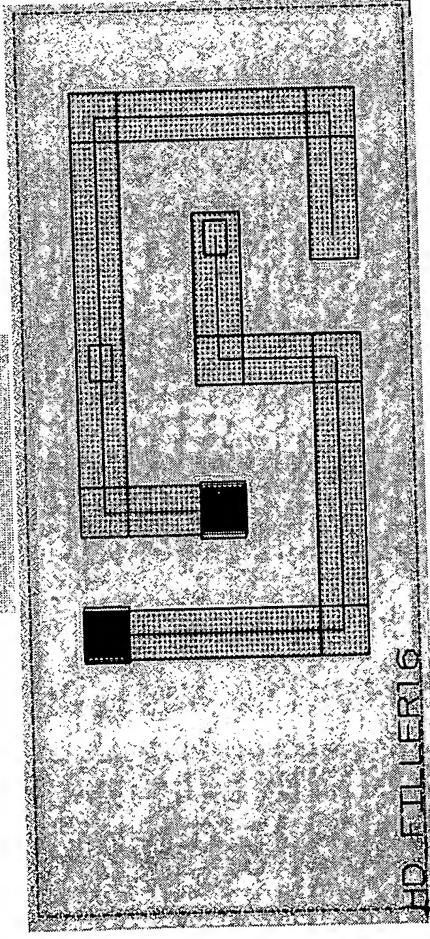
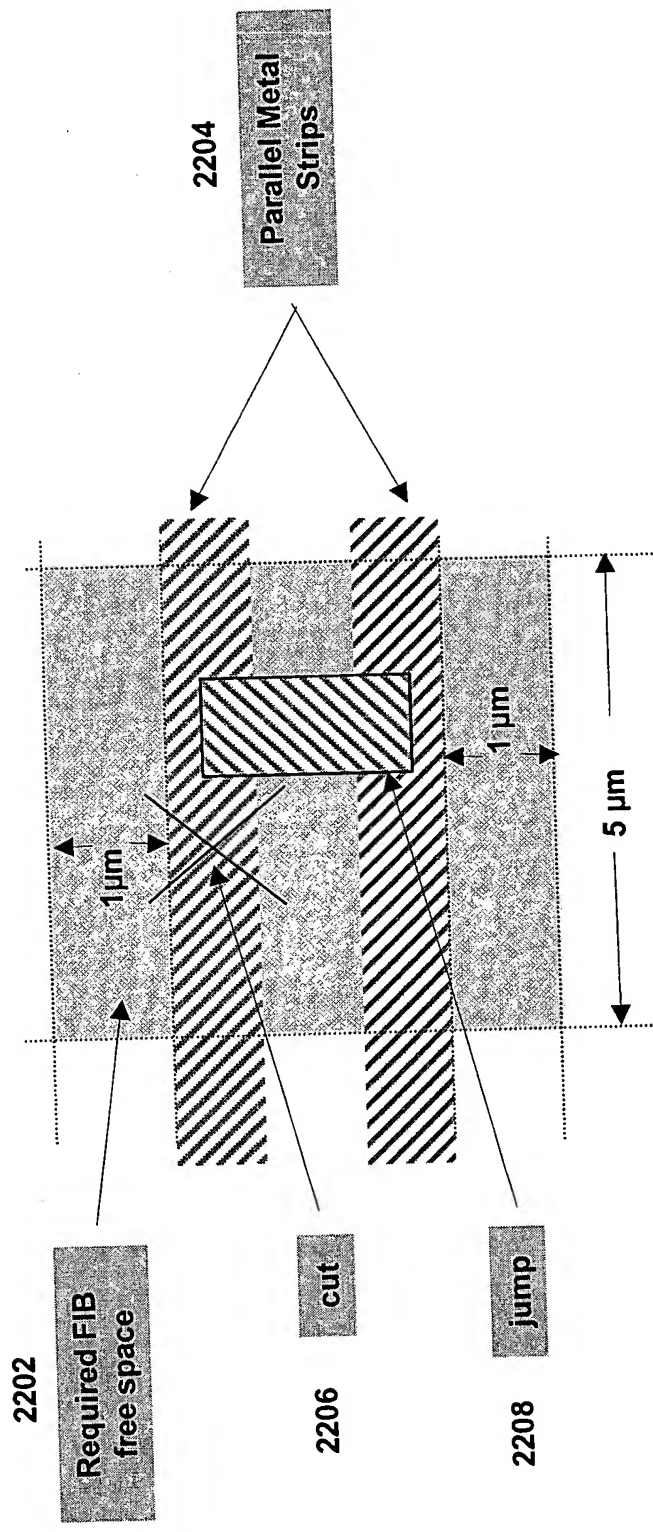


FIG. 21C



**FIG. 22**